

25X1

Approved For Release 2004/04/13 :  
TOP SECRET  
GARFDPV9B01709A000500010037-7

*✓* MCGWG-M-37

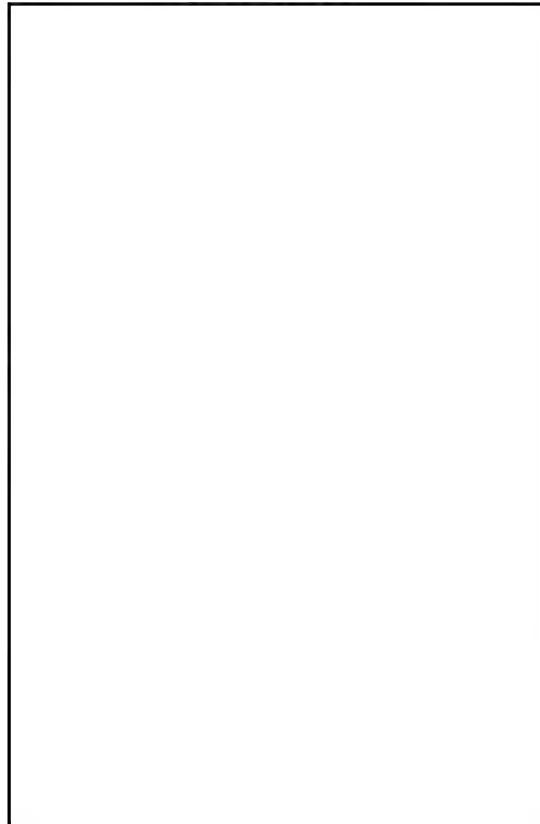
COMIREX MAPPING, CHARTING AND GEODESY WORKING GROUP

Minutes of Meeting Held in Room 1D883  
Pentagon  
1300-1545, 15 August 1968

PRESIDING

Referral review completed by  
NIMA 3/1/01

25X1A



Purpose of Meeting - General

1. The Chairman outlined the purposes of the meeting as identified in the agenda distributed 12 August 1968 and identified as A-MCGWG-M-37.

Computer Programming of KH-4 Requirements

25X1A

2. [ ] mentioned that [ ] would like to bring up a subject for future discussions. [ ] introduced [ ]

25X1A

25X1A

Copy 21 of 28 Copies

25X1

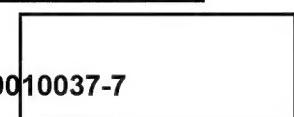
NRO review(s)  
completed.

25X1

Approved For Release 2004/04/13 :  
TOP SECRET  
GARFDPV9B01709A000500010037-7

Excluded from automatic  
downgrading and declassification

*✓ Copy 1 of 10003*



25X1

Approved For Release 2004/04/19 : CIA : T79B01709A000500010037-7

~~TOP SECRET~~

25X1A

25X1A

25X1A

criterion

MCGWG-M-37

and [redacted] of CIA, stating that they were taking steps to place KH-4 collection requirements on a computer and needed clarification of MC&G requirements. [redacted] indicated that they understood that there was a criteria of 10,000 square miles currently being used and questioned whether other criteria might be pertinent to their problem.

[redacted] defined the current situation involving KH-4 collection for MC&G to involve coverage of difficult bad weather areas and relatively small gaps, slivers, etc., in the present coverage. Also, there were other technical criteria being used in the evaluation.

After brief discussion, it was concluded that [redacted] should visit AMS units that accomplish the evaluation of KH-4 coverage and note the nature of the remaining requirement and the evaluation criteria being used. After such a visit, it might be appropriate for them to make recommendations concerning criteria, since collection criteria should take into account the specific areas of concern. Colonel

[redacted] asked that Army make arrangements to provide necessary information

25X1A  
25X1A

25X1A

25X1D

Technical Criteria for Maintaining Geometric Properties in the Processing of [redacted] Photography

25X1A  
25X1A

25X1A

25X1A

25X1D

25X1D

3. [redacted] distributed a copy of criteria that had been prepared by the DoD. Specifically, [redacted] of DIA had worked with key technical personnel of Army, including [redacted] and Air Force,

[redacted] These criteria are attached as enclosure 1 to these minutes. It was explained that they were technical criteria that were intended to insure that distortions that might affect the geometric accuracies achievable in mapping and charting would be held to a minimum. There was very little discussion concerning the substantive aspects of the criteria.

[redacted] indicated that he did not see anything in the criteria that did not seem to be a reasonable objective and that he would propose to pass these criteria on to the West Coast people. He

indicated that we could be assured that step and repeat printing was being planned for the [redacted] data. [redacted] of ETL, Army, pointed out that paragraphs 3 and 4 of the criteria gave numerical figures that pertain to the dupe positive. It was agreed that the criteria statements should be supplemented to make this clear. [redacted] mentioned that the 21 May 1968 memorandum for NRO from Chairman, COMIREX, subject:

Processing [redacted] to Retain Geometric Accuracies (COMIREX-D-15.2/7) had indicated that the MCGWG would furnish the NRO the technical criteria. Following this action, the NRO was asked to inform the COMIREX of its plans for processing, printing and handling the original [redacted] negatives in the light of the requirement for geometric accuracies. Accordingly, since

25X1A

25X1A

25X1A

25X1  
NR  
O

25X1

25X1

Approved For Release 2004/04/19 : CIA : T79B01709A000500010037-7

~~TOP SECRET~~

25X1

Approved For Release 2004/04/12 : CIA-RDP79B01709A000500010037-7

~~TOP SECRET~~

MCGWG-M-37

there was no disagreement with the technical criteria, [redacted] indicated that the criteria would be forwarded to NRO with a copy to COMIREX in accordance with COMIREX-D-15.2/7.

25X1A

25X1A



[redacted]  
25X1

[redacted]  
25X1

Approved For Release 2004/04/12 : CIA-RDP79B01709A000500010037-7

~~TOP SECRET~~

25X1

Approved For Release 2004/04/10 :  
TOP SECRET 9B01709A000500010037-7

MCGWG-M-37

Potential Positioning Requirement

25X1A

5. [redacted] referred to a positioning requirement that was being identified by NPIC and which has been discussed with NRO representatives during a meeting of 6 August 1968 on the West Coast. [redacted] mentioned that he was not prepared to discuss the item fully at this time; however, [redacted] from NPIC described the situation generally and gave background stating that the requirement was to position point targets from the mission ephemeris, particularly targets that have been missed completely in many instances. There needed to be some rapid way of positioning missed targets such that it wouldn't happen in successive missions. The scope of this work could involve as many as 500 per year. He has developed a simple orbit program which combined with attitude data, can be used to position targets [redacted]. He cited an example of moving the position of Lop Nor by 30,000 feet and that he had positioned 63 targets on [redacted]. He expressed accuracies achievable in the range of 920 to 1600 feet when 4 or more orbits were used in the reduction.

25X1A

25X1D

25X1D

25X1A

25X1A

25X1A

25X1A

[redacted] questioned whether the procedure used by [redacted] could have geodetic application to assist the work done in DoD in positioning missile targets. [redacted] commented that DoD geodetic technical and program people were aware of [redacted] technique and recognized the method as a basic approach that would normally yield 1,000-2,000' accuracies. In relation to the data reduction work done in DoD, the method would not include many of the extensive refinements that are required to obtain additional accuracy as done within the DoD where the objective is to obtain accuracies better than 500', 90% assurance. [redacted] mentioned that checks had been made in DoD on many of the locations that [redacted] had improved to assure that there were no basic geodetic inaccuracies which were not expected. Without exception, the checks revealed that those instances where [redacted] had made major improvements were caused by large accidental errors in recording coordinates or identification of the target in concern. It was further mentioned that the question of improving target coordinates for acquisition by the [redacted] system was also being discussed in the ICRS and that the need for improving target coordinates should recognize considerations currently being given to positioning routine targets to an appropriate degree of accuracy before acceptance on the approved acquisition list. [redacted] indicated that the discussion would be continued and that coordination should be accomplished with the ICRS. [redacted] said that he would look into the positioning requirement matter further.

25X1A

25X1A

25X1A

25X1D

25X1A

25X1A

NRO Proposals for Meeting World-Wide Positioning Requirement

25X1A

6. [redacted] gave background, pointing out that the excerpt from the NRO letter forwarded with the agenda for this MCGWG meeting had just

25X1

Approved For Release 2004/04/10 :  
TOP SECRET 9B01709A000500010037-7

25X1

25X1

Approved For Release 2004/04/12 : CIA-RDP79B01709A000500010037-7

~~TOP SECRET~~

25X1A

25X1D

25X1A

25X1A

25X1A

been distributed and that it was only intended to have general considerations and discussion at this time since more time would be needed to define further steps. [redacted] to give further major points, if any. [redacted] indicated that, in essence, the response from NRO leaned heavily toward waiting until the [redacted] system [redacted] was available. He indicated that placing Doppler on the KH-4 with or without the SGLE was very marginal in meeting the requirement and that the SGLE (improved tracking system - Satellite Ground Link Equipment) would not be available until the summer of 1970 at which time there would only be a few remaining KH-4 systems to be operated. [redacted] mentioned that, without extensive review in the DoD, the preliminary reaction to the NRO proposal was disappointment, feeling that much more should be done with the present system (KH-4), and evaluating much more optimistically the accuracies that could be achieved by adding the Doppler with or without the SGLE. Further, improved positions from [redacted] would not be available for about 4 years. [redacted] mentioned that the SGLE may have relatively minor impact. Following the general discussion, it was clear that further technical analyses should be made, and that studies prepared by the NRO in arriving at accuracies should be made available for technical review, and that DoD technical analyses which indicated accuracies achievable should be furnished to NRO. [redacted] mentioned that while there may be differences in technical evaluations, there were also dollar problems in that [redacted] would be involved in trying to obtain improved position by adding Doppler components to the KH-4 system. It was concluded that the NRO proposals required further study and preparation of evaluations before an appropriate course of action could be defined.

25X1A

25X1D

25X1D

25X1A

25X1D

25X1

25X1

Approved For Release 2004/04/12 : CIA-RDP79B01709A000500010037-7

~~TOP SECRET~~

25X1

Approved For Release 2004/04/13 : CIA-RDP79B01709A000500010037-7

**Next 1 Page(s) In Document Exempt**

Approved For Release 2004/04/13 : CIA-RDP79B01709A000500010037-7